

WHAT IS CLAIMED IS:

1. A method for automatic firmware image recovery, comprising:
  - determining that a firmware image for server management operational code in a recipient system needs to be replaced;
  - sending a message over a network by the recipient system, wherein the message requests a compatible replacement firmware image;
  - negotiating with a donor system based on a received acknowledgement that the donor system has a compatible image, using a predetermined policy to select the donor system from a set of at least one donor system having a compatible image;
  - uploading a compatible image sent by the donor system to the recipient system;
  - and
  - updating the recipient system firmware with the uploaded compatible image.
2. The method as recited in claim 1, wherein negotiating comprises:
  - receiving a message request by at least one donor system on the network;
  - determining whether the donor system has a compatible image;
  - if the donor system has a compatible image, sending an acknowledgement and offer to the recipient system; and
  - uploading a compatible image to the recipient system.
3. The method as recited in claim 1, wherein the network is selected from the group consisting of a wired and unwired network.

4. The method as recited in claim 1, wherein the message is sent via an out-of-band (OOB) connection.

5. The method as recited in claim 4, wherein a baseboard management controller residing on the recipient system is capable of communicating to donor systems via at least one communication means, wherein the communication means is selected from a group consisting of a local area network (LAN), a wireless access point, a wired inter-chassis management bus (ICMB), and a Bluetooth® protocol wireless network.

6. The method as recited in claim 1, wherein the donor system comprises a management console.

7. The method as recited in claim 1, wherein the donor system comprises a peer server in the network.

8. A machine accessible medium containing instructions that, when executed, cause a machine to:

determine that a firmware image for server management operational code in a recipient system needs to be replaced;

send a message over a network, wherein the message requests a compatible replacement firmware image;

negotiate with a donor system based on a received acknowledgement that the donor system has a compatible image, using a predetermined policy to select the donor system from a set of at least one donor system having a compatible image;

upload a compatible image sent by the donor system to the recipient system; and

update the recipient system firmware with the uploaded compatible image.

9. The machine accessible medium as recited in claim 8, wherein the network is selected from a group consisting of a wired and unwired network.

10. The machine accessible medium as recited in claim 8, wherein the message is sent via an out-of-band (OOB) connection.

11. The machine accessible medium as recited in claim 10, wherein a baseboard management controller residing on the recipient system is capable of communicating to donor systems via at least one communication means, wherein the communication means is selected from a group consisting of a local area network (LAN), a wireless access point, a wired inter-chassis management bus (ICMB), and a Bluetooth® protocol wireless network.

12. The machine accessible medium as recited in claim 8, wherein the donor system comprises a management console.

13. The machine accessible medium as recited in claim 8, wherein the donor system comprises a peer server in the network.

14. A machine accessible medium containing instructions that, when executed, cause a machine to:

receive a message over a network, the message sent by a recipient system requesting an updated firmware image;

determine by a donor system whether a compatible image is available;

if the donor system has a compatible image, negotiate with the recipient system using a predetermined policy to select the donor system from at least one donor system having a compatible image; and

if the donor system is selected from the at least one donor system having a compatible image, upload the compatible image to the recipient system.

15. The machine accessible medium as recited in claim 14, wherein negotiating comprises instructions that cause the machine to:

- send an acknowledgement offer to the recipient system; and
- receive an acceptance acknowledgement for the offer.

16. A system for automatic firmware image update, comprising:  
a recipient server having at least one processor;  
a baseboard management controller (BMC) operatively coupled to the at least one processor, wherein the BMC comprises a BMC processor, a memory operatively coupled to the BMC processor, a communication interface enabling at least one of wireless network, chassis management bus and local area network communication; and

executable code loaded in memory accessible to the BMC processor that when executed enables the BMC to:

- determine whether operational firmware requires update;
- send a request for an updated image via a network communication interface to a donor server on the network;
- negotiate with the donor server for a compatible image; and
- load an updated compatible image in non-volatile memory on the BMC.

17. The system as recited in claim 16, wherein the request is sent via an out-of-band (OOB) connection.

18. The system as recited in claim 16, wherein the donor system comprises a management console.

19. The system as recited in claim 16, wherein the donor system comprises a peer server in the network.

20. A method for providing a firmware image, comprising:  
receiving a message over a network, the message sent by a recipient system requesting an updated firmware image;  
determining by a donor system whether a compatible image is available;  
if the donor system has a compatible image, negotiating with the recipient system using a predetermined policy to select the donor system from at least one donor system having a compatible image; and  
if the donor system is selected from the at least one donor system having a compatible image, uploading the compatible image to the recipient system.

21. The method as recited in claim 20, wherein negotiating comprises:  
sending an acknowledgement offer to the recipient system; and  
receiving an acceptance acknowledgement for the offer.

22. The method as recited in claim 20, wherein the network is selected from the group consisting of a wired and unwired network.

23. The method as recited in claim 20, wherein the message is sent via an out-of-band (OOB) connection.

24. The method as recited in claim 20, wherein the donor system comprises a management console.

25. The method as recited in claim 20, wherein the donor system comprises a peer server in the network.